

In the Specification:

At page 1, lines 4-6, please amend the paragraph as follows:

Related Patent Documents

This patent document claims the benefit, under 35 U.S.C. § 119(e), of ~~is a continuation of~~ U.S. Provisional Patent Application Serial No. 60/411,286, filed September 16, 2002, and entitled “Platform For Biological Studies.” ~~,” for which priority is claimed pursuant to 35 U.S.C. §120.~~

At page 3, lines 23-27, please amend the paragraph as follows:

The present invention is generally directed to an approach for micro detection/analysis of various molecule types, such as biological species, in a manner that addresses ~~address~~ the aforementioned issues, as well as other related issues. The present invention is exemplified in a number of implementations and applications, some of which are summarized below.

At pages 12-13, lines 20-28 and 1-5 respectively, please amend the paragraph as follows:

FIG. 3 is a perspective physical view of a 3-dimensional configuration for a microcircuit assaying arrangement 300, according to another example embodiment of the present invention, implemented using a single integrated circuit chip having integrated detection and analysis CMOS-based circuitry. With reference to the previously-presented figures, the microcircuit assaying arrangement 300 of FIG. 3 also includes sensor arrays 210 (FIG. 2), a sample preparation device 140 (FIG. 1), and the single integrated circuit chip implementing the processing circuit arrangement 150 (FIG. 1). Various ones of a plurality of test sites 120 are shown in FIG. 3, interconnected by microchannels and microwells for supplying biological samples to selected test sites. The microchannels and microwells can be used for reagent delivery, as previously discussed, and also for DNA confinement during sample illumination. Sensor arrays 210, each corresponding to at least one test site 120, are shown arranged on processing circuit arrangement 150 such that sensor arrays and corresponding test sites 120 are located in close proximity to one another in 3-dimensional space.

At pages 17-18, lines 21-28 and 1-2 respectively, please amend the paragraph by inserting a space at line 26 before “Inc.” as shown:

FIG. 8 is a block diagram illustrating a pyrosequencing arrangement including an imager (*e.g.*, a CCD or a light detection arrangement as discussed above) and ultrasonic sprayer for modeling a microcircuit, according to an example embodiment of the present invention. The pyrosequencing arrangement 1000 is a platform for DNA analysis. Arrangement 1000 includes an ultrasonic sprayer (*e.g.*, a piezoelectric sprayer such as a Microjet Drop on demand dispenser from Microfab, Inc.) 1010, a robotic arm 1020 (*e.g.*, a Beckman Biomek 2000; 1000 armdroid 100 robotic arm made by D&M Computing) and an integrated imaging system 1030 having the imager. Piezoelectric sprayer 1010 is dipped into a nucleotide solution upon which a thin film of solution is formed.